

To assee Department of Environment and Consection, Division of Water Pollution Control 401 Church Street, 6th Floor L & C Annex, Nashville, TN 37243 (615) 532-0625

CONCENTRATED ANIMAL FEEDING OPERATION (CAFO) STATE OPERATING PERMIT (SOP) NOTICE OF INTENT (NOI)

Type of permit you are requesting:	SOPCD0000 (designed	to discharge)	SOPC00000	(no discharge)		nown, please advise		
Application type:	New Permit							
••	If this NOI is submitted for Pe	rmit Modificatio	n or Reissuance prov	ide the existing p	ermit tracking n	number:		
OPERATION IDENTIFICATION								
Operation Name:	Farmer				County: Y	nocon		
	and had Ra	nd			Latitude: N	36.50727936		
Operation Location/ 2440 Physical Address: Sofau	J85.9488518°							
						005.74050.		
Name and distance to nearest recei	ving water(s): 500'	white	Oak Cice	<u>K.,,</u>				
If any other State or Federal Water	:/Wastewater Permits have be	een obtained for	r this site, list those	e permit numbe	rs:			
			лс П	Other	,			
Animal Type: Department Poultry					Mar Cara	(Karalana)		
Number of Animals: 95.00		s: 4	Name o	i integrator. /	· icoaniq	(Keystone)		
Type of Animal Waste Manageme	I I I ionid							
(check all that apply)	Liquid, C	losed System (i.e. covered tank, u					
Attach the NMP NMP Attach	ched Attach the closure pl	lan 🗌 Closu	re Plan Attached	Attach a topo	ographic map	☐ Map Attached		
PERMITTEE IDENTIFICATION								
Official Contact (applicant):		Title or Position	n:					
Dewen A Sw	irdle.	Seuse	<u> </u>		1	☐ Correspondence		
Mailing Address:		City:		State:	Zip:			
Mailing Address: 587 Coleytour Phone number(s):	Kd,	dafayil	te 00	//4	37083	☐ Invoice		
Phone number(s):		E-mail:	11e D.P.la	minns Pr	de com	nga da		
615-666.009		Title or Positio	n: "	procession to the	10.00.			
Optional Contact:					and the second s			
Address:	And the second s	City:		State:	Zip:	Correspondence		
,			711/11 (M.S. 1971)		<u> </u>	Invoice		
Phone number(s):		E-mail:						
		<u> </u>						
APPLICATION CERTIFICATION A	ND SIGNATURE (must be sign	ed in accordan	ce with the require	ments of Rule 1	200-4-505)			
- 10 1 14 -C1	that this document a	and all attact	ments were pro	enarea unaer	my directi	on or supervision		
	Indiamod to occurs th	nat mualitien	nerconnel proi	KELIA SAMICI 9	anu Cyanuai	C MIC HISTORISMENOSI		
in accordance with a syste submitted. Based on my inforgathering the information	quiry of the person or p	ersons who	manage uie sys	knowledge a	nd belief, t	rue, accurate, and		
for gathering the informatic complete. I am aware that	on, the information such	mucu is, w enalties for s	ubmitting false	information	, including	the possibility of		
fine and imprisonment for	knowing violations.	Aldido 10x o						
Name and title; print or type			Signature			Date		
Derver A S	Colfin is		Deuxen	A. Sur	undle	8-11-10		
STATE USE ONLY	KU CMUCL					the same of the sa		
	ReviewerFFO	ero Cookev	ille T&	E Aquatic Fauna	Tı	50°C00041		
I good good good	mpaired Receiving Stream	uner	High Quality Water		N	OC Pate 12-10		
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CN 147 (Rev27-18)

continued

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RDA 2366

SOPC 90046



TENNESSEE DEPARTMENT OF AGRICULTURE

Water Resources Program

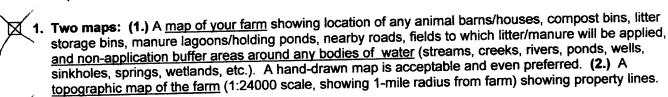


The following individual has submitted all required elements of an NMP/CNMP as required to obtain a CAFO permit. Their Nutrient Management Plan (or CNMP) has been reviewed and approved by this office.

Name of Owner/Operator: <u>Dewey Swindle</u>	
Operation Name: D + J Farms	
Address of Operation: 2440 Coleytown Ro	ad Lafayette, TN 37083
Phone Number: (615) 666-8004	County: Mocon
Date application was initiated:	Date approval forwarded to TDEC:
RECEIVED	AUG 3 1 2010
AUG 1 7 2800	
NMP/CNMP Approval Date:	Date approval received by TDEC
MINIT/CIAINI Approval Bates	
THE APPROVAL SHALL NOT BE CONSTRUED AS CREATING APRESUMPTION OF CORRECT	AECEIVED
AUG 3 1 2010	SEP 01 2010
OPERATION OF AS WARRANTING THAT THE APPROVED FACILITIES WILL REACH THE DESIGNED GOALS	Permit Section
TDA Reviewer's Name: Sam Marshall	
TDA Reviewer's Signature:	U august 31, 2010 Date

Nutrient Management Plan Requirements

The following 9 items need to be submitted at the time the permit is applied for. Additional record-keeping items as outlined in the CAFO rules are also considered part of the nutrient management plan and must be kept on-site. More information on each item can be found in the CAFO rule (1200-4-5-.14).



2. Nutrient budget – this is basically a balance sheet of all manure produced on the farm and all manure spread on the farm or removed from the farm. Application rates for all fields should be based on crop needs, realistic crop yield expectations, and actual manure analyses of nutrient content.

3. Soil test results for phosphorus and potassium for each application field. These must be taken at a minimum of every five years.

4. Results of manure analysis from within the past year. Annual manure testing is a requirement for all CAFOs. These results must be included with initial permit application if the farm is in operation. If the farm that is applying for the permit is new and not yet operating, then manure testing results need to be obtained once operation begins. At that point, the manure test results and revised application rates need to be submitted to TDA. Manure test results in subsequent years need to be kept as part of your record-keeping activities.

Results of the **Phosphorus Index** applied to each field that has a soil test P value of "High" or "Very High". In those situations, this tool will determine whether your application rates will be based on nitrogen or phosphorus.

6. Statement regarding method of dead animal disposal.

7. Closure Plan to be implemented in the event animal production ceases on the site.

These last two items are only required for medium-size CAFOs that manage liquid manure.

8. Documentation of **design of liquid waste handling system**. This should include, but is not limited to:
volume for solids accumulation, design treatment volume, total design volume, the approximate number of days of storage capacity, pumping and routing of wastes, and any solid separation process. Ideally, this documentation would consist of the pertinent engineering drawings with accompanying descriptive narrative.

The construction, modification, repair, or installation of any portion of a CAFO liquid waste handling system (such as earthen holding pond, treatment lagoon, pit, sump or other earthen storage/containment structure) after April 13, 2006 must be preceded by a thorough **subsurface investigation**. This investigation will include a detailed soils investigation with special attention to the water table depth and seepage potential.

In addition to the items above, the following form(s) must accompany your application:

Notice of Intent form must be submitted with all applications from Class II (Medium) CAFOS ECEIVED

OR

EPA Forms 1 and 2B must be submitted with all applications from Class I (Large) CAFOs. SEP 0 1 2016

Addendum to Nutrient Management Plan.

Closure Plan

In the event that broiler production at this location ceases, the following will be done within 360 days:

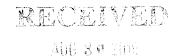
- Any litter/compost currently in storage at the time of closure will be removed and spread on the farm or spread elsewhere according to my Nutrient Management Plan.
- All litter in houses will be removed and spread on the farm or spread elsewhere according to my Nutrient Management Plan.
- All land application of litter will be done at application rates calculated in the Nutrient Management Plan.
- The most current litter analysis will be provided to anyone removing litter from the farm.
- Any dead birds in the houses at the time of closure will be composted.

Devey A. Swindle
Date: 8-23-10

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Addendum to Nutrient Management Plan:

By my signature below, I affirm that I have read, understand, and will comply with the following stipulations from Tennessee's CAFO rule (1200-4-5-.14) that apply to my CAFO operation.

- 1) All clean water (including rainfall) is diverted, as appropriate, from the production area.
- 2) All animals in confinement are prevented from coming in direct contact with waters of the state.
- 3) All chemicals and other contaminants handled on-site are not disposed of in any manure, litter, process wastewater, or storm water storage or treatment system unless specifically designed to treat such chemicals and other contaminants.
- 4) All sampling of soil and manure/litter is conducted according to protocols developed by UT Extension.
- 5) All records outlined in 1200-4-5-.14(16)d-f will be maintained and available on-site.
- 6) Any confinement buildings, waste/wastewater handling or treatment systems, lagoons, holding ponds, and any other agricultural waste containment/treatment structures constructed after April 13, 2006 are or will be located in accordance with NRCS Conservation Practice Standard 313.
- 7) Drystacks of manure or stockpiles of litter are always kept covered under roof or tarps.
- 8) An Annual Report will be written for my operation and submitted between January 1 and February 15 of each year. It will include all information required by rule [1200-4-5-.14(16)g].

Signature of CAFO Operator:

8-4.09

Date

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1 Swindle

D & J Farms Nutrient Management Plan

Operation:

A four house broiler farm that produces birds presently for Keystone Foods. Capacity is 92,000 birds per house with six flocks per year maximum cycles. Litter production is based on 2.1 lbs per bird with annual production of 662 tons (assuming 6 cycles per year).

Litter Management:

Litter is de-caked between each flock and is stored in a litter storage shed awaiting land application or sales to third parties. Total clean out is performed no more than once a year and can stretch to every third year depending on conditions inside the house. Annual litter analysis is performed to monitor the N-P-K content of the natural resource.

Fertilizer Application:

Fertilizer is applied on the basis of annual soil sample for individual fields on four different farms that are tributary to this broiler operation. Phosphorous levels are monitored closely and if no "P" is called for none is applied to the fields. Commercial fertilizer will be purchased and applied on Nitrogen needs as well as Potassium. This is the simplest and cheapest way we have found to manage the P in the soils. If litter is spread on the farm it will be applied on the rate of 1.5 tons per acre and using the most recent P205 level on our litter that would be equivalent to 70lbs of phosphorous. We will not spread litter until the test calls for at least 60/lbs per acre of P as time and economics don't work for our operation to spread at the lower rate, thus we revert to the commercial application.

Table of Soil samples for the 4 tributary farms:

	Mar-10	-							
Sample	Field	Acres	Crop	Soil PH	N Rate	Soil Test P	P205 Rate	Soil Test K	K20 Rate
jb1	J1-B	7	Fescue	6.7	60/120	M	30	L	60
j2	J2	3	Fescue	6.3	60/120	Н	0	M	30
jf2	J1-2A	6	Fescue	6.9	60/165	M	30	L	60
if3	J1-3A	5	Fescue	7	60/165	Н	30	L	60
J5	J5 A	4	Fescue	6.4	60-120	M	30	V	0
j4	J5B-C	6	Fescue	6.4	60/120	Н	0	M	30
- j3	J3 A-B	7	Fescue	6.3	0/90	M	30	L	60
•	J9	7	Fescue	6.5	0/90	Н	0	L.	60
	J10	9	Fescue	6.5	0/90	Н	0	L	60
	B4	5	Fescue	6.4	0/90	M	30	M	30
	B5	4	Fescue	6.3	60/120	M	30	M	30
	В3	10	Fescue	6.3	60/120	L	60	Н	0
В6	B6-7-8	9	Fescue	6.3	60/120	V	0	M	30
S1	S1-S1 A	22	Fescue	6.3	30/120	Н	0	L	60
	S2	9	Fescue	6.4	0/90	L	60	Н	0
T1 A	TA-1	16	Fescue	6.6	30/120	Н	0	Ĺ	60
T1 B	TB-1	4	Fescue	6.4	30/120	Н	• 0	Н	0
	T2	10	Fescue	6.7	30/120	н	0	L	60

On a regular basis litter is sold off the farm to local tobacco producers. A nutrient profile is available upon request and records are keep as to whom the sales occur.

SEP 0 1 2010

AUG 9.5 2010

Tom Swindle

Results of Litte Analysis on a as is basis (lbs/ton) using average of two samples

Nutrient	Analysis	All 4 Houses
Nitrogen	30.6	20269
Phosphorus (as P2 05)	46.75	30948
Potassium (as K 2 0)	40.6	26877

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Form 1

NUTRIENT MANAGEMENT PLAN FOR THE POULTRY INDUSTRY

GENERAL INFORMATION									
Name of farm D43 4c	County								
Farm owner's name Deway	3. Swindle Telephone no. 415-6666-2277								
Mailing address <u>9440 Coleytown Pd</u> <u>dayayethe</u> TN <u>37083</u> Zip									
TYPE OF POULTRY FARM OPI	ERATION (check all that apply)								
Farm situation	Type of poultry								
⊭ Existing □ New □ Expanding	☐ Broilers ☐ Broiler breeder replacements ☐ Broiler breeders ☐ Table egg type hens ☐ Table egg type replacements								
Farm owner signature Welley	Date: 8-4-09								
Dewey A. Swindle									
Signature Devery A. Swort	Date 8-4-09								
Assistance in completing this nutrient	management plan was provided by: (check all that apply)								
University of Tennessee Ag	gricultural Extension Service								
☑ Natural Resources Conserv	ration Service								
□ Private consultant									
□ Other(name)									

THIS PAGE MUST BE SUBMITTED TO THE TENNESSEE DEPARTMENT OF AGRICULTURE TO OBTAIN A CAFO II GENERAL PERMIT

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Form 2

CALCULATING POULTRY LITTER PRODUCTION

The total tons of poultry litter produced on your farm can be estimated by using one or more of the following methods:

<u>Broil</u>	ers	Example	Your farm
a. b. c. d. e. f.	Total number of birds on farm per flock Number of flocks per year Total farm bird capacity (a x b) Pounds of litter produced per bird (see Table 5) Pounds of litter produced per year (c x d) Tons of litter per year (e ÷ 2000)	50,000 birds 6 flocks 300,000 birds 2.1 pounds 630,000 pounds 315 tons	92.000 6 552.000 2.4 1.324.800 662.4
Pulle	ts (Broiler Breeder or Table -egg -type)	Example	Your farm
a. b. c. d. e. f.	Total number of birds on farm per flock Number of flocks per year Total farm bird capacity (a x b) Pounds of litter produced per bird (see Table 5) Pounds of litter produced per year (c x d) Tons of litter per year (e ÷ 2000)	22,000 birds 2 flocks 44,000 birds 5 pounds 220,000 pounds 110 tons	
Hens	(Broiler Breeder or Table-egg-type)	Example	Your farm
a. b. c. d. e. f.	Total number of birds on farm per flock Number of flocks per year Total farm bird capacity (a x b) Pounds of litter produced per bird (see Table 5) Pounds of litter produced per year (c x d) Tons of litter per year (e ÷ 2000)	20,000 birds 1 flocks 20,000 birds 35 pounds 700,000 pounds 350 tons	

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Crop*	Acres	(tons/acre)	(tons)
Februe Paskue	100 acres	1,5	150
Fescus Hay	80 acres	1.5	120
From day	U		
Information for this chart	will come from the w	orksheet for each crop.	
		needed to meet crop	270
	nitrogen re Total tons	quirements produced on your farm	662
Poultry Litter Use		,	
Cons of litter used in owner	rs farming operation		a d A
	-Fertilizer -Feed		270
	-Other		
Tons of litter removed from	n poultry farm by owr	ner	270
Tons of litter removed fror			392
Total tons of litter used in			662
Manure Handling (check all that appl	Methods		Disposal Method

Litter Litter Litter Litter	taken directly to fields on the farm stockpiled and covered with plastic stockpiled in a building used in a composter sold or given away used as cattle feed removed from the farm by the poultry farm	Composting Incineration Covered in gro Permitted land Rendering Other	-	RECEIVE
Litter	removed from the farm by the poultry lair	TIC1	specify	SEP 01 2010
Litter	removed from the farm by a third party			OCI 0 1 7010
☐ Litter ☐ Other	used as a fuel in a heating system			Permit Section

specify THIS PAGE MUST BE SUBMITTED TO THE TENNESSEE DEPARTMENT OF AGRICULTURE TO OBTAIN A CAFO II GENERAL PERMIT

Note: It soil samples don't call for "t" mo, letter is used on the form. More will be sold or either stored in letter sheds.

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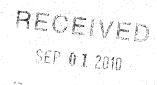
AGRICULTURAL DIAGNOSTIC LABORATORY UNIVERSITY OF ARKANSAS - FAYETTEVILLE

***MANURE FOR FERTILIZER ANALYSIS (report for AGRI-429)

Name:	DEWEY SWINDLE		Received in lab:	3/29/2010	
Address:	2440 COLEYTOWN RD		Mailed:	4/02/2010	
City:	LAFAYETTE		State,Zip:	TN 37083	
County:	MACON (TN)		CK#	2022	
Lab. No.	M100445	M100446			
Sample No.		2			
Animal type	broilers	broilers		<u> </u>	
-age/lbs	7 wk/6.75 lbs	7 wk/6,75 lbs		<u> </u>	
Bedding type	shavings/sawdust	none given			
Manure type	cake	dead bird com	poster		
Sample date	3/22/2010	3/22/2010		<u> </u>	
Age of manure	1 yr	none given			
pН	8.7	8.7			
EC(umhos/cm)	13600	14100			
% H20	29.89	63,68			
	ол	dry basis			
Total %N	4.11	4.21			
Total %P	1.63	2.49			
Total %K	3.91	4.61			
Total %Ca	3.44	5.04			
Total %Carbon	36.47	34.94			
NO3-N, mg/kg					
NH4-N, mg/kg					
	on "as	s-is" basis			
Total %N	2.88	1.53			
Total %P	1.14	0.90	13.0	at the	
Total %K	2.74	1.68			***************************************
Total %Ca	2.41	1.83			
Total %Carbon	25.57	12.69			
NO3-N, mg/kg					
NH4-N, mg/kg					
	ibs/	ton on "as-is" basis			
N	57.6	30.6			
P205	52.2	41.3			
K20	66.3	40.6			
Ca	48.2	36.6			
Total Carbon	511.4	253.8		· · · · · · · · · · · · · · · · · · ·	
NO3-N					e de la composición del composición de la composición de la composición del composición de la composic
NH4-N					

^{***}all analyses performed on "as-is" basis/ "dry" basis is calculated from moisture content

^{*}Ibs/ton K2O = %Total K on "as-is" basis multiplied by 20*1.2



AUG 17 2010

^{*}Ibs/ton P2O5 = %Total P on "as-is" basis multiplied by 20*2.29

THE UNIVERSITY OF TENNESSEE

SOIL TEST REPORT

DEWEY SWINDLE 2440 COLEYTOWN ROAD

LAFAYETTE, TN 37083

Manager Soil. Plant and Pest Center 5201 Marchant Drive Nashville, TN 37211-5112 (615) 832-5850 soilplantpestcenter@utk.edu

Date Tested: 3/25/2010

Cou	nty: Macon							L	ab Nu	mber: 🖁	3837	′61
		Mil.	enlich d	SOILTES	FES	ueire am	HRAT	INGS#	er last			
Samp	e ID B4			(1	Pounds	Per Acre	1					
Water pH	Buffer P Value Phosphorus	K Potassium	Ca Calcium	Mg Magnesium	Zn Zinc	Cu Copper	Fe Iron	Mn Manganese	B Boron	Na Sodium	S Sulfur	Nitrates (ppm)
6.4	24 M	101 M	1479 S	361 <i>S</i>								
	Organic Soluble Matter Salts % PPM**											

RECOMMENDATIONS

B4

Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N/P,O,/K,O

Nitrogen/Phosphate/Potash: 0-90 / 30 / 30 pounds per acre

Limestone:

Lime is not recommended at this time

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

Cou	inty: M	acon						BONES SAZER WOODE	and the second second second	.ab Nu	mber:	_ 383/	02
		200	. N	ehlich 1	SOIL TES	i resi	JETS an	dRAT	INGS*	1			
Samp	le ID	B5))	ounds	Per Acre	1					
Water pH	Buffer Value	P Phosphorus	K Potassium	Ca Calcium	Mg Magnesium	Zn Zinc	Cu Copper	Fe Iron	Mn Manganese	B Boron	Na Sodium	- 19.4Table 1	Nitrates (ppm)
6.3		64 H	144 M	1626 S	354 S								
	Organ Matt %						7	enter China)			
							,	and the second	ef				

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Permit Section

SWINDLE - Page 1

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.) **PPM = Parts per Million

If you have questions about these recommendations, contact your County Extension office.

Visit our web site at http://soilplantandpest.utk.edu for additional information.

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B5

Fertilizer/Lime Application Rate and Timing

Cool Season Grass Pasture b. Maintenance

N / P,O, ₹K,O

Nitrogen/Phosphate/Potash: 60-120 / 0 / 30 pounds per acre

Limestone:

Lime is not recommended at this time

Apply recommended amounts of phosphate and potash in one application anytime during the year. Apply 60 pounds of nitrogen per acre August 15 to September 15 and from March 1 to March 30. If additional growth is only needed during one season, apply nitrogen for that season only. If fescue is stockpiled in the fall, apply 60 pounds of N per acre August 15 to September 15.

Cot	ınty: Macon							L	ab Nur	nber: 🏯	3837	63
		M	ehlich 1	Solleyes	Tres	JETS an	d RAT	INGS*				
Samp	le ID B3			+ + 1	Pounds	Per Acre)					
Water pH	Buffer P Value Phosphorus	K Potassium	Ca Calcium	Mg Magnesium	Zn Zinc	Cu Copper	Fe Iron	Mn Manganese	B Boron	Na Sodium	S Sulfur	Nitrates (ppm)
6.3	9 <i>L</i>	168 <i>H</i>	1339 S	294 S								
	Organic Soluble Matter Salts											

RECOMMENDATIONS

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Fertilizer/Lime Application Rate and Timing

Cool Season Grass Pasture b. Maintenance

N/P2O5/K2O

Nitrogen/Phosphate/Potash: 60-120 / 60 / 0 pounds per acre

Limestone:

Lime is not recommended at this time

Apply recommended amounts of phosphate and potash in one application anytime during the year. Apply 60 pounds of nitrogen per acre August 15 to September 15 and from March 1 to March 30. If additional growth is only needed during one season, apply nitrogen for that season only. If fescue is stockpiled in the fall, apply 60 pounds of N per acre August 15 to September 15.

Cou	nty: Macon	M	ehlich i SOIL Ti⊑S	T RESU	JLTS and F	AND WOOD STREET, STREE	ab Num	iber: 383 <i>i</i>	764
Samp	le ID S1			per la	Per Acre)				
Water pH	Buffer P Value Phosphorus	K Potassium	Ca Mg Calcium Magnesium	Zn Zinc		Fe Mn ron Manganese	B Boron	Na S Sodium Sulfur	Nitrates (ppm)
6.3	31 H	89 L	1358 S 250 S						
	Organic Soluble Matter Salts % PPM**				441 - 1415 11 - 141				

RECOMMENDATIONS

S1

Fertilizer/Lime Application Rate and Timing

Grass/Legume Hay b. Maintenance

N/P2O5/K2O

Nitrogen/Phosphate/Potash: 30-120 / 0 / 60 pounds per acre

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Limestone:

Lime is not recommended at this time

Permit Section

SWINDLE - Page 2

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.)

**PPM = Parts per Million

If you have questions about these recommendations, contact your County Extension office.

Visit our web site at http://soilplantandpest.utk.edu for additional information.

456 L Table

Apply 30 pounds of N per acre March 1-30 and again after first cutting if an accuronal cutting is expected. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

Cou	unty: Macon					11 #C.ac	и вал	CONTRACTOR OF THE PARTY OF THE	ab Nur	nber:	3837	65
Samp	le ID S2	M	ehlich 1	SOIL TES	TOTAL DESCRIPTION OF THE PARTY	Per/Acre	ACCUMENTATION.					
Water pH	Buffer P Value Phosphorus	K Potassium	Ca Calcium	Mg Magnesium	Zn Zinc	Cu Copper	Fe Iron	Mn Manganese	B Boron	Na Sodium	S Sulfur	Nitrates (ppm)
6.4	44 H	289 H	1450 S	348 S								
	Organic Soluble Matter Salts											

RECOMMENDATIONS

S2

Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N/P,O,/K20

Nitrogen/Phosphate/Potash: 0-90 / 0 / 0 pounds per acre

Lime is not recommended at this time Limestone:

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

Lab Number: County: Macon Mehlich 1 SOIL TEST RESULTS and RATINGS*

Samp	ile ID D4						O SOLUTION OF					
Water pH	Buffer P Value Phosphorus	K Potassium	Ca Calcium	Mg Magnesium	Zn Zinc	Cu Copper	Fe Iron	Mn Manganese	B Boron	Na Sodium	S Sulfur	Nitrates (ppm)
6.1	10 L	241 H	1316 S	237 S								

Soluble Organic Salts Matter

RECOMMENDATIONS

D4

Fertilizer/Lime Application Rate and Timing:

Cool Season Grass Pasture b. Maintenance

N/P2O5/K2O

Nitrogen/Phosphate/Potash: 60-120 / 60 / 0 pounds per acre

Lime is not recommended at this time

Limestone: Apply recommended amounts of phosphate and potash in one application anytime during the year. Apply 60 pounds of nitrogen per acre August 15 to September 15 and from March 1 to March 30. If additional growth is only needed during one season, apply nitrogen for that saason onty; if fescue is stockpiled in the fall, apply 60 pounds of N per acre August 15 to September 15.

County: Macon

SEP 0-1-2010

Lab Number: 383767

383766

Permit Section

SWINDLE - Page 3

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.) **PPM = Parts per Million

If you have questions about these recommendations, contact your County Extension office.

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Meh...n 1 SOIL TEST RESULTS and RATH Pounds Per Acre ∴ D6 Sample ID **Nitrates** S В RECT Cu Zn Ca Ma K Sulfur (ppm) Sodium p Manganese Boron Iron Copper Buffer Zinc Water Magnesium Calcium Potassium Phosphorus Value pΗ 1224 S M 104 H 6.3 37 Organic Soluble Matter Salts % PPM"

REGOMMENDATIONS

D6

Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N / P205/ K20

Nitrogen/Phosphate/Potash: 0-90 / 0 / 30 pounds per acre

Lime is not recommended at this time

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

Lab Number: 383768 County: Macon Mehlich 1 SOIL TEST RESULTS and RATINGS (Pounds Per Acre) Sample ID

Nitrates Fe Zn Cu Ma Ca Sodium Sulfur (mgg) K P Manganese Boron Copper iron Water Buffer Zinc Calcium Magnesium Potassium **Phosphorus** Value pН S 378 1596 Н 31 6.6 SEP 0 1 2010 Soluble Organic Saits Matter

Permit Section

RECOMMENDATIONS

TA1

Fertilizer/Lime Application Rate and Timing

Grass/Legume Hay b. Maintenance

N/P,O,/K,O

Nitrogen/Phosphate/Potash: 30-120 / 0 / 60 pounds per acre

PPM*

Lime is not recommended at this time

Apply 30 pounds of N per acre March 1-30 and again after first cutting if an additional cutting is expected. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year. Lab Number: 383769

County: Macon Mehlich 1 SOIL TEST RESULTS and RATINGS'

(Pounds Per Acre)

Sample ID T1B Na S **Nitrates** В Mn Cu Fe Mg 7n Ca K (ppm) Sulfur Boron Sodium Water Ruffer Iron Manganese Copper Zinc Calcium Magnesium Potassium Phosphorus Value pH 1265 S 344 Н 171 6.4 36 Н

SWINDLE - Page 4

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.) **PPM = Parts per Million

If you have questions about these recommendations, contact your County Extension office.

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T18

Fertilizer/Lime Application Rate and Timing

Grass/Legume Hay b. Maintenance

N/P205/K20

Nitrogen/Phosphate/Potash: 30-120 / 0 / 0 pounds per acre

Limestone:

Lime is not recommended at this time

Apply 30 pounds of N per acre March 1-30 and again after first cutting if an additional cutting is expected. For fall stockpilling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

County: Macon Lab Number: 383770

Menlich 1 SOIL TEST RESULTS and RATINGS:

7n

Zinc

(Pounds Per Acre)

Cu

Copper

Iron

В

Boron

Manganese

Na

Sodium

S

Sulfur

Nitrates

(maga)

Sample ID T2 Ca Water Buffer Mg **Phosphorus** Potassium Calcium pH Value Magnesium 6.6 46 Н 72 1973 S 369 S Organic Soluble Matter Salts PPM"

RECOMMENDATIONS

T2

Fertilizer/Lime Application Rate and Timing

Grass/Legume Hay b. Maintenance

N/P,O,/K,O

Nitrogen/Phosphate/Potash: 30-120 / 0 / 60 pounds per acre

Limestone:

Lime is not recommended at this time

Apply 30 pounds of N per acre March 1-30 and again after first cutting if an additional cutting is expected. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

County: Macon Lab Number: 383771

Mehlich 1 SOIL TEST/RESULTS and RATINGS*

Sample ID JB1 (Pounds Per Acre)

К Ca Water Buffer Ma Zn Cu Mn В Na S Nitrates **Phosphorus** Potassium pΗ Value Calcium Magnesium Zinc Copper Iron Manganese Boron Sodium Sulfur (magg) 6.7

Organic Soluble Matter Salts

PPM™

21 M 73 L 1825 S 310 S

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Permit Section

SWINDLE - Page 5

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.)

**PPM = Parts per Million

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MR 17 And

JB1

Fertilizer/Lime Application Rate and Timing

Cool Season Grass Pasture b. Maintenance

N/P2O5/K2O

Nitrogen/Phosphate/Potash: 60-120 / 30 / 60 pounds per acre

Lime is not recommended at this time

Apply recommended amounts of phosphate and potash in one application anytime during the year. Apply 60 pounds of nitrogen per acre August 15 to September 15 and from March 1 to March 30. If additional growth is only needed during one season, apply nitrogen for that season only. If fescue is stockpiled in the fall, apply 60 pounds of N per acre August 15 to September 15. Lab Number: 383772

County: Macon

Mehlich 1 SOIL TEST RESULTS and RATINGS*

(Pounds Per Acre

JF2 Sample ID S Nitrates Na Fe Cu Sulfur (maga) Zn Sodium Mq Boron Ca Manganese K Copper fron Zinc Magnesium Buffer Calcium Water Potassium **Phosphorus** Value pΗ

S 307 2364 S 42 26 Μ 6.9

Soluble Organic Saits Matter PPM*

RECOMMENDATIONS

Fertilizer/Lime Application Rate and Timing

JF2 Grass Hay b. Maintenance

PPM*

N/P,O,/K20

Nitrogen/Phosphate/Potash: 60-165 / 30 / 60 pounds per acre

Lime is not recommended at this time

Apply recommended amounts of phosphate and potash in one application anytime during the year. Apply 60 pounds of nitrogen per acre March 1-30. Where a second cutting is expected, apply an additional 45 pounds 0f N per acre immediately after the first cutting. If fescue is stockpiled in the fall, apply 60 pounds of N per acre August 15 to

If urea is the nitrogen source, especially for fall topdressings, some loss of nitrogen may occur if applied to moist soils followed by three or more days of rapidly drying conditions without rainfall. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year. 383773 Lab Number: 3

County: Macon	Me	illeh (! S	OIL TES	RESUL ounds P	TS and er Acre)	RATI	NGS* »				
Sample ID JF3 Water Buffer Phosphorus Po	K otassium	Ca Calcium	Mg Magnesium	Zn Zinc	Cu Copper	Fe Iron	Mn Manganese	B Boron S	Na Jodium	S Sulfur	Nitrates (ppm)
pH Value Thosphores	39 L	1882 S	300 S								
Organic Soluble Matter Salts					DI						

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SWINDLE - Page 6

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.) **PPM = Parts per Million

If you have questions about these recommendations, contact your County Extension office. Visit our web site at http://soilplantandpest.utk.edu for additional information.

JF3

Fertilizer/Lime Application Rate and Timing

Grass Hay b. Maintenance

N/P205/K20

Nitrogen/Phosphate/Potash: 60-165 / 0 / 60 pounds per acre

Lime is not recommended at this time

Apply recommended amounts of phosphate and potash in one application anytime during the year. Apply 60 pounds of nitrogen per acre March 1-30. Where a second cutting is expected, apply an additional 45 pounds of N per acre immediately after the first cutting. If fescue is stockpiled in the fall, apply 60 pounds of N per acre August 15 to September 15.

If urea is the nitrogen source, especially for fall topdressings, some loss of nitrogen may occur if applied to moist soils followed by three or more days of rapidly drying conditions without rainfall. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year. Lab Number: 383774

County: Macon Mehlich 1 SOIL TEST RESULTS and RATINGS (Pounds Per Acre) Sample ID **Nitrates** S Na Mn R Fe Zn Cu Sulfur (mag) Ca Sodium Boron Manganese Iron Copper Buffer Magnesium Zinc Water Calcium Potassium Phosphorus pH Value 266 S S 1596 47 47 6.5 Soluble Organic Salts Matter PPM*

RECOMMENDATIONS

J10

Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N/P2O5/K2O

Nitrogen/Phosphate/Potash: 0-90 / 0 / 60 pounds per acre

Lime is not recommended at this time

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year. 383775 Lab Number:

County: Macon Mehlich 1 SOIL TEST RESULTS and RATINGS (Pounds Per Acre) J9: Sample ID **Nitrates** S B Na Fe Mn Cu Ma Zn (ppm) Sodium Ca Sulfur K Boron Iron Manganese Buffer Zinc Copper Water Calcium Magnesium Potassium **Phosphorus** Value pH S 1622 S 237 88 15 6.5 Soluble Organic Salte RECEIVED PPM*

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SWINDLE - Page 7

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.) **PPM = Parts per Million

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Fertilizer/Lime Application Rate and Timing

J9

Grass-Clover Pasture b. Maintenance

N / P,O, / K,O

Nitrogen/Phosphate/Potash: 0-90 / 60 / 60 pounds per acre

Lime is not recommended at this time

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year. 383776

County: Macon

Lab Number:

Menlich I SOIL TEST RESULTS and RATINGS*

Sample ID

(Pounds Per Acre)

Samp	ie in	J4		E A CONTRACTOR OF THE SECOND					Nitrates
Water pH	Buffer Value	P Phosphorus	K Potassium	Ca Calcium	Mg Zn Magnesium Zinc	Cu Fe Copper Iron	Mn B Manganese Boron	Na S Sodium Sulfur	(ppm)
6.3		33 H	136 M	1569 S	312 S				

Soluble Organic Salts Matter PPM* %

RECOMMENDATIONS

_J2

Fertilizer/Lime Application Rate and Timing

Cool Season Grass Pasture b. Maintenance

N/P205/K20

Nitrogen/Phosphate/Potash: 60-120 / 0 / 30 pounds per acre

Lime is not recommended at this time

Apply recommended amounts of phosphate and potash in one application anytime during the year. Apply 60 pounds of nitrogen per acre August 15 to September 15 and from March 1 to March 30. If additional growth is only needed during one season, apply nitrogen for that season only. If fescue is stockpiled in the fall, apply 60 pounds of N per acre August 15 to September 15.

County: Macon

Lab Number:

383777

Mehlich 1 SOIL TEST RESULTS and RATINGS

(Pounds Per Acre)

Sample ID J5	il de gener	(Country Country Count	
Water Buffer P pH Value Phosphorus	K Potassium	Ca Mg Zn Cu Fe Mn B Calcium Magnesium Zinc Copper Iron Manganese Boron	Na S Nitrates Sodium Sulfur (ppm)
6.4 23 M	321 V	1660 S 301 S	

Organic Soluble Salts Matter PPM** %

RECOMMENDATIONS

J5

Fertilizer/Lime Application Rate and Timing

Cool Season Grass Pasture b. Maintenance

N/P,O,/K,O

Nitrogen/Phosphate/Potash: 60-120 / 30 / 0 pounds per acre

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Permit Section

Limestone:

Lime is not recommended at this time

SWINDLE - Page 8

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.) **PPM = Parts per Million

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дрыу тесопиленией атпочить от phosphate and potash in one application anytime during the year. Apply 60 pounds of nitrogen per acre August 15 September 15 and from March 1 to March If additional growth is only needed during one season, apply nitrogen for that season only. If fescue is stockpiled in the fall, apply 60 pounds of N per acre August 15 to September 15.

County: Macon 383778 Lab Number: Mehlich 1 SOIL TEST RESULTS and RATINGS* (Pounds Per Acre) Sample ID K Water Buffer Ca Mq Zn Cas Fe Win В Na S Nitrates Phosphorus Potassium Calcium ЫG Value Magnesium Zinc Copper iron Manganese Boron Sadium Sulfur (ppm) 6.4 156 M 1848 S 330 S Organic Soluble Matter Salts % PPM*

RECOMMENDATIONS

J4

Fertilizer/Lime Application Rate and Timing

Cool Season Grass Pasture b. Maintenance

N/P,O,/K,O

Nitrogen/Phosphate/Potash: 60-120 / 0 / 30 pounds per acre

Limestone:

Lime is not recommended at this time

Apply recommended amounts of phosphate and potash in one application anytime during the year. Apply 60 pounds of nitrogen per acre August 15 to September 15 and from March 1 to March 30. If additional growth is only needed during one season, apply nitrogen for that season only. If fescue is stockpiled in the fall, apply 60 pounds of N per acre August 15 to September 15.

County: Macon Lab Number: 383779 Mehlich 1 SOIL TEST RESULTS and RATINGS* (Pounds Per Acre) Sample ID J3 K Water Buffer Ca Ma Zn Cu Fe Mn В Na ٩ Nitrates **Phosphorus** Potassium Magnesium pH Calcium Value Zinc Copper iron Manganese Boron Sodium Sulfur (ppm) 6.3 22 M 56 1382 S 208 Organic Soluble Matter Salts % PPM

RECOMMENDATIONS

J3.

Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N/P,O,/K,O

Nitrogen/Phosphate/Potash: 0-90 / 30 / 60 pounds per acre

Limestone:

Lime is not recommended at this time

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

County: Macon

Lab Number: 383780

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SWINDLE - Page 9

*Ratings: Indicates relative availabilite of multionts (oplants. (See back of this form for detailed explanation.) **PPM = Parts per Million

If you have questions about these recommendations, contact your County Extension office.

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Samp	ie ID B7	Me	. Ji 4	SOIL TES		LTS and Per Acre)		<u>\$</u>				
Water pH	Buffer P Value Phosphorus	K Potassium	Ca Calcium	Mg Magnesium	Zn Zinc	Cu Copper	Fe Iron	Mn Manganese	8 Boron	Na Sodium	S Sulfur	Nitrates (ppm)
6.3	132 V	145 M	1747 S	340 S								
	Organic Soluble Matter Salts % PPM**											

В7

Fertilizer/Lime Application Rate and Timing

Cool Season Grass Pasture b. Maintenance

N/P2O5/K2O

Nitrogen/Phosphate/Potash: 60-120 / 0 / 30 pounds per acre

Lime is not recommended at this time

Apply recommended amounts of phosphate and potash in one application anytime during the year. Apply 60 pounds of nitrogen per acre August 15 to September 15 and from March 1 to March 30. If additional growth is only needed during one season, apply nitrogen for that season only. If fescue is stockpiled in the fall, apply 60 pounds of N per acre August 15 to September 15.

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Permit Section

SWINDLE - Page 10

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.) **PPM = Parts per Million

If you have questions about these recommendations, contact your County Extension office. Visit our web site at http://soilplantandpest.utk.edu for additional information.

THE UNIVERSITY OF TENNESSE



Lab Number:

В

Boron

Lab Number:

Mn

Manganese

Extension

SOIL TEST REPORT

DEWEY SWINDLE 2440 COLEYTOWN ROAD

LAFAYETTE, TN 37083

Manager Soil, Plant and Pest Center 5201 Marchant Drive Nashville, TN 37211-5112 (615) 832-5850 soilplantpestcenter@utk.edu

Na

Sodium

361085

Nitrates

(maga)

Date Tested: 3/18/2009

County: Macon

Mehlich 1 SOIL TEST RESULTS and RATINGS*

Zn

(Pounds Per Acre)

Cu

Copper

Fe

Iron

Sample ID D6 Ca

Mg Buffer **Phosphorus** Value Potassium Calcium Magnesium Zinc 7.4 48 Н 364 1216 S 298 S

ĸ

Soluble Organic Matter Salts PPM**

RECOMMENDATIONS

D6

Water

pΗ

5.9

Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N/P2O5/K2O

Nitrogen/Phosphate/Potash: 0-90 / 0 / 0 pounds per acre

Limestone:

2 tons per acre

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

County: Macon

Mehlich 1 SOIL TEST RESULTS and RATINGS*

(Pounds Per Acre)

Sample ID D₅

Water Buffer P K Ca Mg Zn Cu Fe Mn В Na Nitrates **Phosphorus** Potassium Calcium рΗ Value Magnesium Zinc Copper Iron Manganese Boron Sodium (maga)

5.5 74 22 M 170 904 S 162

> Organic Soluble Matter Salts PPM**

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Permit Section

SWINDLE - Page 1

361086

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.) **PPM = Parts per Million

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D5

Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N / P2O5/ K2O

Nitrogen/Phosphate/Potash: 0-90 / 30 / 0 pounds per acre

Limestone:

2.5 tons per acre

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

Lab Number: County: Macon

						L													

(Pounds Per Acre) D3

Fe Mn В Na Nitrates Ca Mg Zn Cu ĸ Water Buffer Copper Iron Manganese Boron Sodium (mag) Magnesium Zinc Phosphorus Potassium Calcium Value рΗ

6.2 12 1 155 M 1553 S 266 S

> Soluble Organic Salts Matter

RECOMMENDATIONS

D3

Sample ID

Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N / P2O5/ K2O

Nitrogen/Phosphate/Potash: 0-90 / 60 / 30 pounds per acre

Limestone:

Lime is not recommended at this time

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

Lab Number: 361088 County: Macon

Mehlich 1 SOIL TEST RESULTS and RATINGS*

Sample ID

J5

(Pounds Per Acre)

Ca Mg Zn Cu Fe Mn R Na Nitrates ĸ Water Buffer Zinc Copper Iron Manganese Boron Sodium (ppm) Calcium Magneslum **Phosphorus** Potassium pН Value 6.2 84 Н 468 2218 S 398

Soluble Organic Matter Salts PPM'

RECOMMENDATIONS

J5

Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N / P2O5/ K2O

Nitrogen/Phosphate/Potash: 0-90 / 0 / 0 pounds per acre

SWINDLE - Page 2

361087

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.)

**PPM = Parts per Million

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KKULLY ZU

Limestone:

Lime is not recommended at this time

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

County: Macon Lab Number: 361089 Mehlich 1 SOIL TEST RESULTS and RATINGS* (Pounds Per Acre) Sample ID J10 Ca Cu Fe Water Buffer Mn В Nitrates Na **Phosphorus** Potassium Calcium Magnesium Zinc Copper iron Boron рΗ Value Manganese Sodium (ppm) 6.2 1852 S 94 99 326 S

Organic Soluble Matter Salts % PPM**

RECOMMENDATIONS

J10

Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N / P2O5/ K2O

Nitrogen/Phosphate/Potash: 0-90 / 0 / 30 pounds per acre

Limestone:

Lime is not recommended at this time

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

County: Macon Lab Number: 361090

Mehlich 1 SOIL TEST RESULTS and RATINGS*

Sample ID J1 (Pounds Per Acre)

Mg Zn Cu Fe Mn В Nitrates Water Buffer Na **Phosphorus** Potassium Calcium Magnesium Zinc Copper Iron pН Value Manganese Boron Sodium (ppm)

6.0 7.4 35 *H* 102 *M* 1757 *S* 253 *S*Organic Soluble Matter Salts

PPM**

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RECOMMENDATIONS
Fertilizer/Lime Application Rate and Timing

te and Timing

Grass-Clover Pasture b. Maintenance

N/P2O6/K2O

Nitrogen/Phosphate/Potash: 0-90 / 0 / 30 pounds per acre

Limestone:

J1

2 tons per acre

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

SWINDLE - Page 3

*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.)

**PPM = Parts per Million

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Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

County: Macon Mehlich 1 SOIL TEST RESULTS and RATINGS*

Lab Number:

361091

Sample ID Buffer

Value

J9

Ca Potassium Calcium

Magnesium

S

196

(Pounds Per Acre)

Fe

Mn Manganese В Na Sodium Nitrates (ppm)

5.7 7.3

Water

pΗ

29

297 Н 1545 S

Zn Zinc

Copper

Iron

Boron

Μ

Phosphorus

Organic Soluble Salts Matter % PPM*

RECOMMENDATIONS

J9

Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N/P2O5/K2O

Nitrogen/Phosphate/Potash: 0-90 / 30 / 0 pounds per acre

Limestone:

2.5 tons per acre

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

County: Macon

Buffer

Value

Lab Number:

Mehlich 1 SOIL TEST RESULTS and RATINGS*

Sample ID

Water

pН

J3

Phosphorus

Ca

Potassium

322 V Calcium

1226 S

Ma Magnesium

232

Zn Zinc

(Pounds Per Acre)

Cu Copper

Fe Iron Manganese

Mn

Boron

Na Sodium

Nitrates (ppm)

5.5 7.3 45 Н Organic Soluble

Matter Salts % PPM*

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RECOMMENDATIONS

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Fertilizer/Lime Application Rate and Timing

Grass-Clover Pasture b. Maintenance

N / P2O2/ K2O

Nitrogen/Phosphate/Potash: 0-90 / 0 / 0 pounds per acre

Limestone:

2.5 tons per acre

The nitrogen should be omitted on pastures containing more than 30 percent clover in the spring, otherwise if clover is less than 30 percent of the pasture apply 30 pounds of nitrogen per acre between March 1-30. For fall stockpiling of fescue apply 60 pounds of N per acre August 15 to September 15 to all fescue-clover mixtures.

Apply recommended amounts of phosphate and potash in one application anytime during the year. If more than 4 tons of lime per acre are required, apply only 4 tons of lime per acre and re-test after one year.

County: Macon

Lab Number:

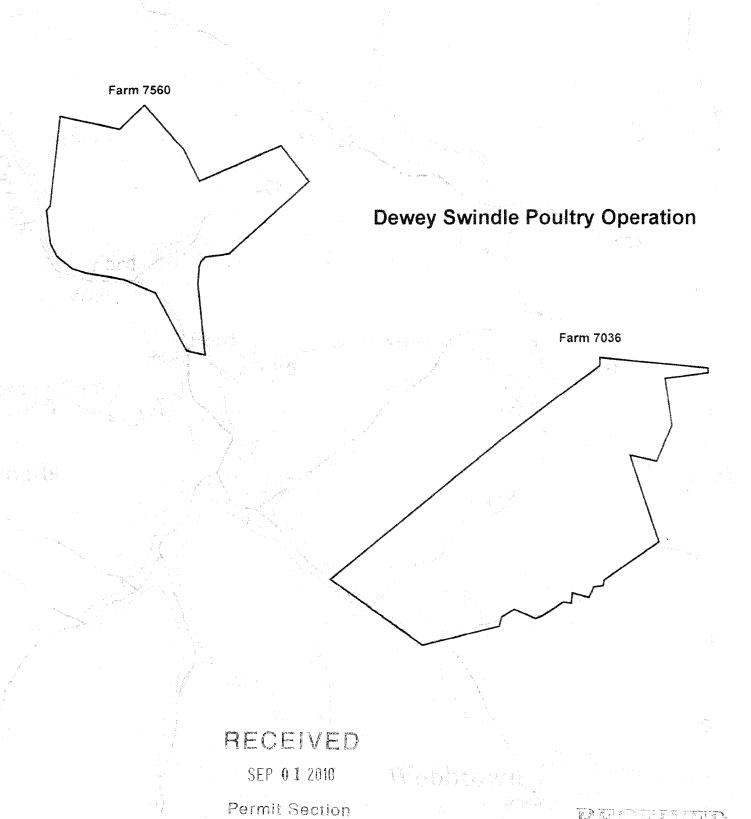
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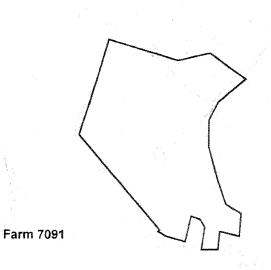
SWINDLE - Page 4

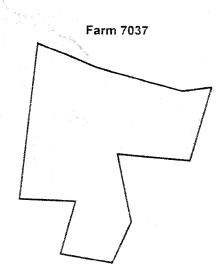
*Ratings: Indicates relative availability of nutrients to plants. (See back of this form for detailed explanation.) **PPM = Parts per Million

If you have questions about these recommendations, contact your County Extension office.

Visit our web site at http://soilplantandpest.utk.edu for additional information.







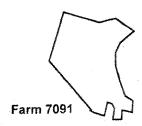
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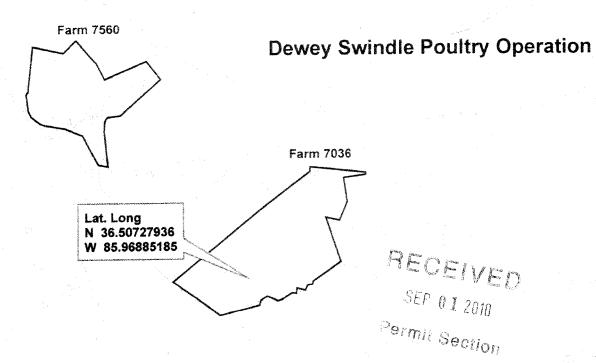
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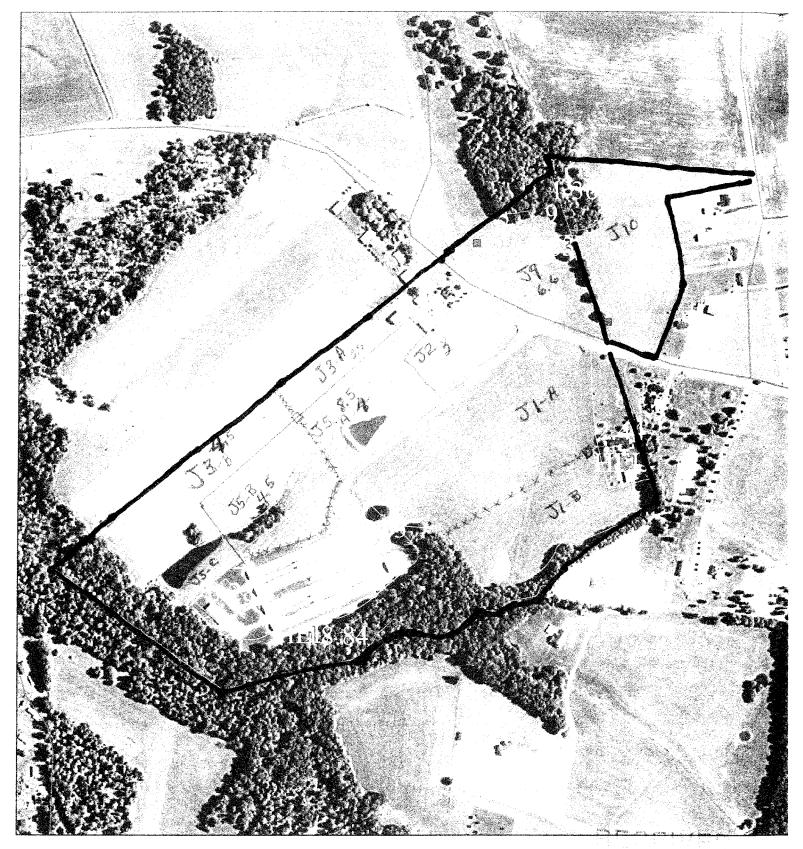




Topo Map Name

Galen







United States Department of Agriculture Farm Service Agency

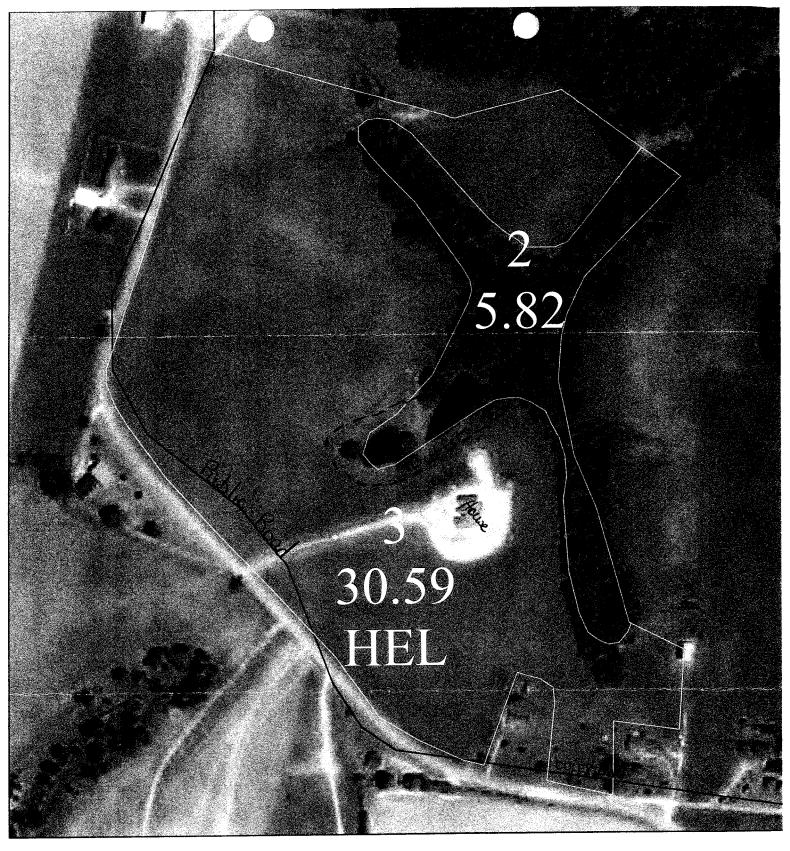
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Macon County, TN

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2007 fsn 7036

not to scale





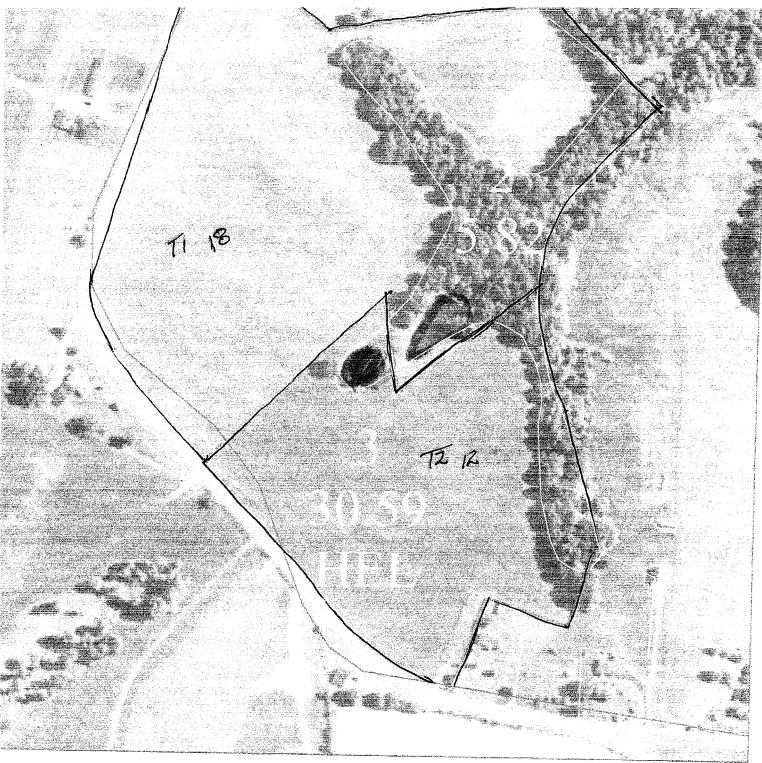
United States Department of Agriculture Farm Service Agency

Grid:

Macon County

FSN 7091





United States Department of Agriculture Farm Service Agency

2007-fsn 7081

Title String Wacon County, TN

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Samples

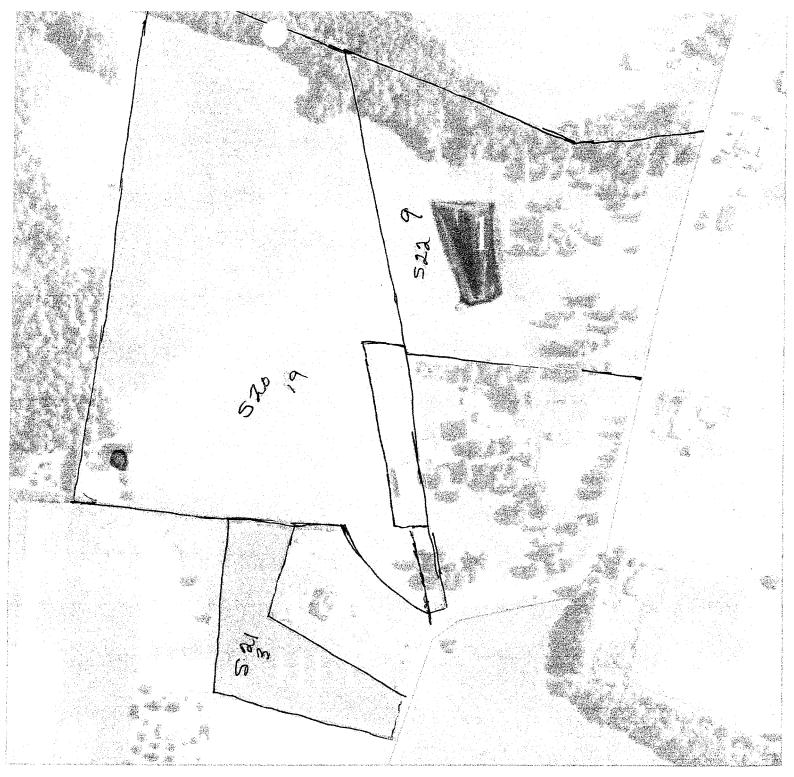
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United States Department of Agriculture Farm Service Agency

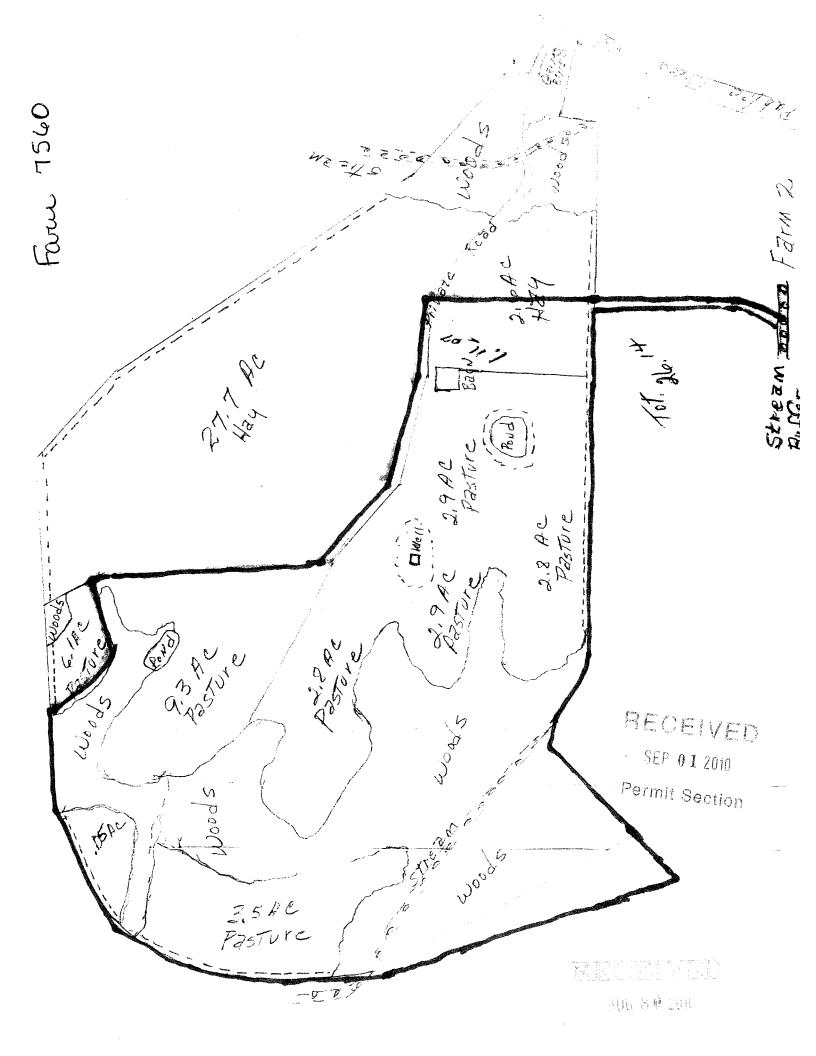
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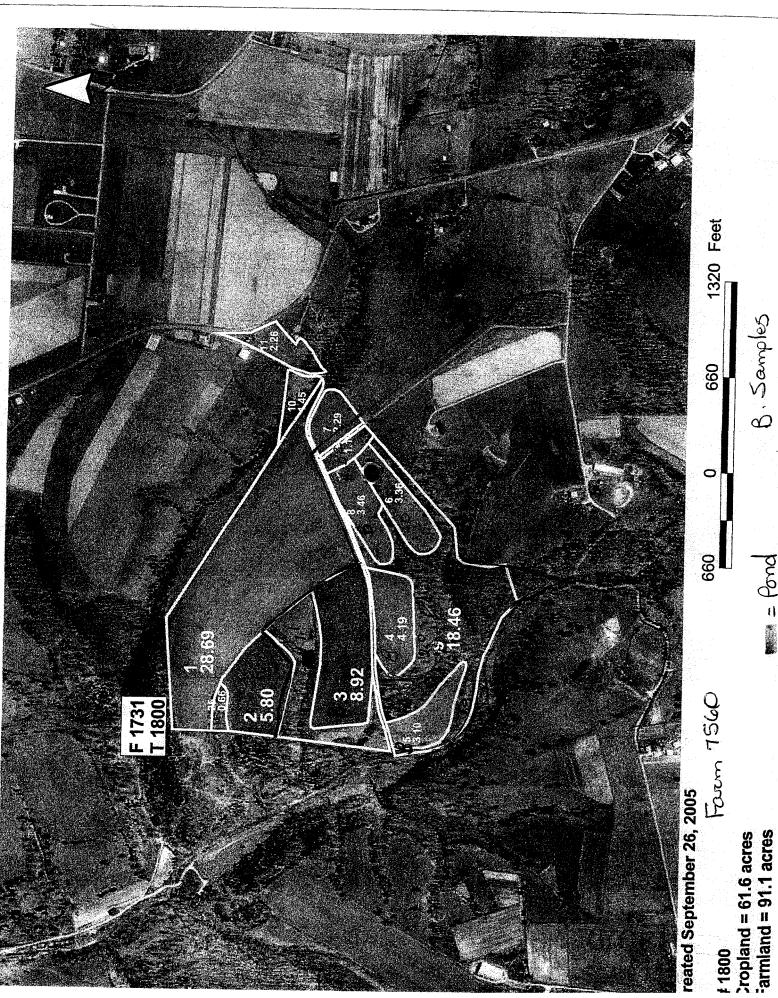
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5- Samples

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